



**STATE OF MONTANA
MONTANA DEPARTMENT OF TRANSPORTATION
JOB PROFILE**

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Update

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Formal Review

Date Submitted _____

SECTION I - Identification

Working Title: District Environmental Engineering Specialist

Department: Transportation

Job Code Number: 172556

Division & Bureau:

Rail, Transit, and Planning Division
Environmental Services Bureau

Job Code Title: Environmental Engineering Specialist

Section & Unit: Environmental Engineering
Section

Pay Band: 6

Work Address: Great Falls District Office

Position Number: 92338

Phone: 406.454.5896

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FLSA Exempt

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FLSA Non-Exempt

☒

Non-Union

☐

MPEA

☐

Blue Collar

Profile Completed By:

Heidy Bruner, P.E., Engineering Section Supervisor

Thomas S. Martin, P.E., Environmental Services Bureau Chief

Work Phone:

406.444.7203

406.444.0879

Work Unit Mission Statement or Functional Description:

Environmental Services Bureau (ESB) mission for MDT is to be the expert regarding all environmental issues, concerns and opportunities. The ESB provides guidance to all Divisions and the Director's Office to ensure compliance with environmental laws, rules, regulations, policies, orders, and agreements. The ESB identifies and evaluates potential impacts of transportation construction and maintenance activities on natural, social, and economic resources and recommends measures to avoid, minimize, or mitigate such impacts in compliance with applicable local, state, federal, and tribal regulations and policies. Resources evaluated by ESB include those pertaining to fish, wildlife, vegetation, wetlands, water resources, water quality, historic, cultural, archaeological, paleontological, hazardous and solid waste, erosion and sediment control, air quality, noise, visual, social, economic, etc.

The Environmental Engineering Section plays an integral part in ensuring that MDT's work is conducted in accordance with laws such as the National Environmental Policy Act (NEPA), Montana Environmental Policy Act (MEPA), Clean Water Act (CWA), Montana Water Quality Act, and applicable

MDT and Federal Highway Administration (FHWA) rules, standards and guidelines to accomplish the project development goals and objectives of MDT. The Section maintains a high level of knowledge, skill, and ability in applying these laws to MDT's activities: preconstruction, planning, construction, maintenance, aviation, motor carriers, and facilities. The Section coordinates with planning, design, maintenance, and construction, and develops policies, guidelines, and procedures to ensure that all MDT projects meet the requirements of NEPA, MEPA, the CWA, and other applicable federal, state, and local laws.

Describe the Job's Overall Purpose:

This position is commonly referred to as the District Environmental Engineering Specialist (DEES). The DEES serves in the District for the Engineering Section of the ESB. This position is responsible for implementing MDT's erosion and sediment control, storm water, construction, and maintenance environmental permitting and compliance activities and programs at the District level to ensure compliance with local, State, Federal and Tribal regulations. This position is responsible for assisting with the development and delivery of environmental compliance and stewardship training programs. This position provides training for district field staff; contractors; other MDT work units; and other local, state, and federal agencies in accordance with ESB policy. This position exercises solid environmental engineering judgment coupled with accurate interpretation of environmental laws. The position's daily supervision is from the District Administrator (DA) or DA delegate in the area the position is working. This position reports to the Environmental Engineering Section in the ESB for work prioritization, policy, and procedures. The DEES routinely coordinates with the Field Services Engineer (FSE) regarding technical and ESB policy matters. This position does not supervise other agency personnel.

SECTION II - Major Duties or Responsibilities

This section should be a clear concise statement of the position's major duties and the approximate percent of work time for each duty

% of Time

- | | |
|---|--|
| A. <u>CONSTRUCTION ENVIRONMENTAL COMPLIANCE ASSISTANCE</u> | 30% |
|
 | |
| 1. | This position provides professional and technical assistance, guidance and recommendations to district staff, Engineering Project Managers and contractors to promote compliance with applicable environmental regulations, permits, project plans, specifications, environmental commitments, and MDT and ESB policies and procedures. |
| 2. | At the request of ESB, reviews environmental permit conditions and environmental special conditions within the contract document. Conducts reviews of preliminary bid packages for environmental issues that could affect constructability and construction activities. Develops suggested revisions, edits or additions to plans and special provisions and coordinates with ESB regarding their insertion in the contract documents. |
| 3. | Participates in Pre-Construction Conferences to provide information and guidance regarding contract design features and special provisions related to environmental issues, environmental permit requirements for permanent and temporary facilities, and applicable environmental rules and regulations. This work will include preliminary information sharing to facilitate efficient Stream Protection Act (SPA) Notification, 318 Authorization, Construction Dewatering and Clean Water Act (CWA) permitting related to temporary facilities and construction practices. |
| 4. | The position is responsible for reviewing and evaluating Contractors' SPA 124 and CWA Section 404 permit applications for temporary facilities and construction activities. As |

necessary, the review will include suggestions for modifications to facilitate effective, efficient securing of Contractors' temporary facilities and construction permits in compliance with applicable laws. As requested by ESB, this position will coordinate with regulatory agencies to address questions or concerns regarding the permit applications and assist the Field Services Engineer in agency discussions to negotiate and/or clarify permit conditions, as necessary. This position will coordinate with field staff and/or Contractors to review permit conditions and promote proper implementation of and compliance with those conditions.

5. In coordination with the EPM, conducts on-site reviews to promote compliance with environmental permits, commitments, policies, procedures and applicable regulatory requirements, as well as for adherence to environmental-related standard specifications and special provisions. Monitors the effectiveness of environmental performance and procedures and makes recommendations to enhance environmental compliance, efficiency and cost effectiveness. Coordinates with contractors through the EPM and project staff to resolve problems at the lowest level possible. Assists construction personnel with issues related to erosion and sediment control Best Management Practices (BMPs) for purposes of complying with FHWA funding requirements.
6. Coordinates with District personnel and Contractors to participate in Final Construction Inspection for Project Close-out to confirm environmental compliance to facilitate storm water permit transfers from the contractor or endorse the contractor's termination of storm water permit. Investigates contractor recordkeeping and compliance history to assess risk to the Department (or local agency) associated with permit transfer. If the Contractors' permit is to be transferred to a local agency, this position will provide technical assistance to local agency personnel if needed.
7. Coordinates with District personnel to conduct on-site reviews to ensure uniform contract administration measures related to environmental permitting, water quality protection, storm water management, and other project elements to ensure compliance with contract documents, applicable environmental regulations, and requirements for federal aid. Monitors the effectiveness of contract administration policy and procedures and makes recommendations to improve efficiency or cost effectiveness. Provides input into the development of contract administration measures related to environmental matters.
8. Coordinates or conducts investigations of actual or potential environmental compliance deficiencies during construction. Recommends measures and practices to rectify deficiencies. This involves coordinating with other ESB staff, road and bridge designers, materials engineers, and other specialists required for deficiency investigations, reporting on findings, and recommending mediation and/or enforcement actions. As necessary, prepares documentation of potential non-compliance or assists the contractor in preparing documentation of potential non-compliance to ensure reporting of potential non-compliance events in accordance with MDT policy and applicable requirements.
9. Develops alternatives and innovative approaches to complex engineering problems (e.g., unexpected site or environmental conditions, design flaws, safety concerns, etc.) to promote compliance with environmental regulations and permits. This involves advanced engineering design, research, and coordination among various department work units and environmental regulatory agencies to identify and resolve construction or design deficiencies.
10. Develops and promotes uniform contract administration measures related to BMPs to ensure full compliance with all requirements for federal aid. Monitor the effectiveness of contract administration policy and procedures and make recommendations to improve efficiency and cost effectiveness.

11. Provides advice and guidance to District personnel on the evaluation and analysis of contract claims related to environmental matters. This involves researching, compiling, and presenting pertinent information in professional and accessible formats; conducting investigations of claims, plans, and specifications; documenting findings; developing legally defensible conclusions; and recommending appropriate actions.
12. Provides environmental compliance advice, guidance and training to District staff in regard to water quality protection; storm water permitting; erosion and sediment control BMP implementation, inspection, and maintenance; temporary facilities and construction activity permitting; MS4 permitting; etc.
13. Correspond with regulatory agencies to obtain or furnish information regarding construction projects.
14. This position will function as a liaison between Field construction crews and other ESB personnel to foster effective communications. Serve as a contact and information point for district staff on environmental permitting for construction activities and temporary facilities.
15. Reviews requests for change orders and provide input regarding additional environmental permitting or review that may be triggered. Coordinates with other ESB personnel regarding the need for additional or modified permitting related to permanent facilities environmental documents, clearances, and permits.

B. MAINTENANCE ENVIRONMENTAL COMPLIANCE ASSISTANCE 30%

1. The position is responsible for evaluating proposed activities to be conducted by MDT maintenance personnel for purposes of determining applicable environmental permitting, suggesting alternative means of accomplishing the maintenance work to minimize permitting responsibilities and enforcement risks, and ultimately preparing the permit joint application form in compliance with Federal, State and local regulations for ESB submittal. As necessary, this position will coordinate with regulatory personnel to address questions or concerns regarding the permit applications and to negotiate and/or clarify permit conditions. This position will coordinate with maintenance staff to review applicable laws and permit conditions and promote proper implementation of and compliance with those laws and conditions.
2. This position will function as a liaison between maintenance personnel and other ESB personnel to foster effective communications and facilitate necessary environmental reviews such as Montana Environmental Policy Act (MEPA) compliance, protection of biological resources, and remediation of spill or hazardous material sites. As requested by Maintenance personnel, assist with preparation of environmental checklists for submittal to ESB. As requested by other ESB personnel, conduct on-site reviews of locations of proposed approach, utility or encroachment permit applications.
3. This position is responsible for developing Storm Water Pollution Prevention Plans (SWPPPs) for maintenance activities in accordance with Montana and National Pollution Discharge Elimination System (MPDES and NPDES) Construction General Permit requirements. This position is responsible for preparing the NOI for ESB submittal and overseeing Maintenance administration of these permit requirements including SWPPP updates, inspections, BMP installation and maintenance and revegetation efforts. This position is responsible for conducting annual inspections as applicable and for preparing the final stabilization report for Storm Water Permit termination. Prepares Notice of Termination (NOT) packets for Environmental Services Bureau Chief signature.

4. Coordinates with District Maintenance personnel to conduct on-site reviews to promote compliance with environmental permits and applicable regulatory requirements. Monitors the effectiveness of environmental performance and procedures and makes recommendations to enhance environmental compliance, efficiency or cost effectiveness.
5. Coordinates or conducts investigations of actual or potential environmental compliance deficiencies during maintenance activities. Recommends measures and practices to rectify deficiencies. This involves coordinating with other ESB personnel, road and bridge designers, materials engineers, and other specialists required for deficiency investigations, reporting on findings, and recommending mediation and/or enforcement actions. As necessary, coordinates with ESB and Resource Agencies and prepares documentation of potential non-compliance to ensure reporting of potential non-compliance events in accordance with MDT policy and applicable requirements.
6. Coordinate with ESB and district staff to identify appropriate locations for implementation of Federal Revegetation Management Program funds. As requested by other ESB personnel, the DA or DA delegate, assist with on-site reviews, contractor selection, work assignments, and contractor oversight.

C. MUNICIPAL SEPARATE STORM SEWER SYSTEM (MS4) COMPLIANCE 20%

1. This person is responsible for participating in activities to comply with Municipal Separate Storm Sewer System (MS4) permits within his/her district. Provides direction and coordination for administrative details related to local MS4 programs to ensure cost-effective expenditures as well as compliance with Local, State and Federal requirements. This work involves researching and monitoring urban environmental engineering practices and standards, determining their applicability to MDT operations and objectives, and participating in the development of policies and procedures to implement the most efficient strategies and practices.
2. Monitors and evaluates information to determine compliance with established local, State and Federal policies and procedures. Uses professional judgment to review program operations and project plans; and through discussions with other Department staff and management, implements compliance measures. Monitors compliance with established MDT policies.
3. Conducts outfall screening and storm drainage system mapping in compliance with applicable rules, regulations, and permit requirements.
4. Assists ESB and Legal Services in development of MOUs, responses to audits, deficiency and violation reports, and negotiation options regarding Local, State, and Federal MS4 requirements.
5. Participates in creating, organizing, promoting and presenting training for the six measures required by federal and state law, (Public Education and Outreach, Public Participation and Involvement, Illicit Discharge Detection and Elimination, Construction Site Storm Water Control, Post-Construction Storm Water Management, Pollution Prevention and Good Housekeeping for Municipal Operations).
6. Participates in development of Storm Water Management Plans and annual reporting for MS4 permit compliance.
7. As requested by other ESB personnel, assist in design of post-construction storm water management in new development and redevelopment.

8. Coordinates with Maintenance and facilities staff in the district to ensure appropriate pollution prevention and good housekeeping for municipal operations.

D. OTHER DUTIES 20%

1. This position performs a variety of other duties as assigned by the ESB, District Supervisor, or as determined by the incumbent in support of the Department mission and Section objectives. This work includes exchanging information with agency staff, professional consultants, and the public; providing training, education, and professional and technical assistance; directing special projects; participating in ongoing training and educational programs; and performing a variety of other duties as directed.
2. This position is required to have a working knowledge of a wide variety of environmental regulations, rules, and permits in order to service as a first point of contact for district field staff and to coordinate with and provide support for ESB operations and activities.
3. Provides input into the direction, planning, and coordination of MDT's storm water, and environmental permitting and compliance programs, and related operations and activities for the District. Participates in the development of short and long-term Field Services plans and program objectives to ensure that they comply with local, State, Federal, and Tribal standards in a cost-effective manner. This work involves assessing current water quality standards, regulations, preventative or corrective action strategies; construction project needs for the District; changing technologies and project requirements; permitting processes; and a variety of other issues. The incumbent synthesizes these assessments and analyses to assist in the development of long-term implementation strategies through coordination with the ESB Engineering Services Section staff, other Section, Bureau and Division staff, and supervisors as well as state and federal agencies (e.g., FHWA, EPA, DEQ, FWP, COE, etc.).
4. Participates in the development of ESB Engineering Section's Field Services program policies, procedures, guidelines, standards, to ensure that the District's interests, recommendations and concerns are given the appropriate level of consideration in their development. Assesses changes in state and national environmental trends and standards and applies them to MDT and the contractors' practices and standards in a manner that will meet specific and variable construction project needs. Understands new technologies, and other changing factors to develop new approaches to policy and program issues.
5. Analyzes and evaluates changes in local, State, Federal, and Tribal water quality requirements and incorporates them into ongoing MDT Field Services programs and district projects. Typical State and federal regulations that the incumbent must be familiar with include the Clean Water Act (CWA), National Pollutant Discharge Elimination System (NPDES), Montana Pollutant Discharge Elimination System (MPDES), the Montana Water Quality Act, Montana Stream Protection Act, State and National Environmental Policy Acts, and others. New technologies, construction practices, and unusual or unprecedented site characteristics require innovative and theoretical application of environmental engineering concepts and principles to ensure effective integration and application of these requirements.
6. Provides input into the Department's statewide erosion and sediment control strategies, programs and guidelines by assisting in the definition of standards, objectives, and procedures. Participates in the development of innovative approaches to water quality protection issues as they relate to erosion and sediment control, storm water pollution prevention, and MDT activities while providing for efficient and cost-effective construction and maintenance processes and methods.

7. Represents the District and MDT at public and professional meetings and conferences. ;
Represents the District at MDT work groups to provide coordination with other programs, ensure that the District's goals and objectives are effectively represented, and provide professional expertise and advice.

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1. ***The following duties and/or specific tasks listed under section II above are considered "essential functions" because they require specialized expertise and skill and are the primary reasons the job exists (they must be performed by this position with or without accommodations):***

The following mental and physical demands are associated with these essential functions:

PHYSICAL

- This position requires travel throughout the state typically in excess of 12,000 miles per year to conduct project reviews, inspections, and site evaluations; attend public/project meetings; and meet with government officials. Physical activities include occasional lifting and placement of temporary erosion control BMP's in inclement weather.

MENTAL

- This position requires effectively managing confrontational situations related to environmental compliance. This position must manage stress from implementing complex, confusing, changing, and potentially contradictory laws, regulations, and permit requirements.

2. ***Does this position supervise others?*** ☐ Yes ☒ No

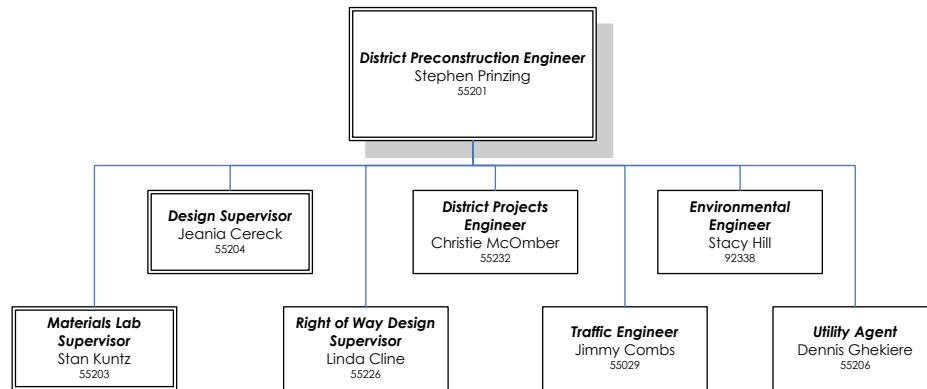
Number directly supervised:

Position Number(s) of those supervised: N/A

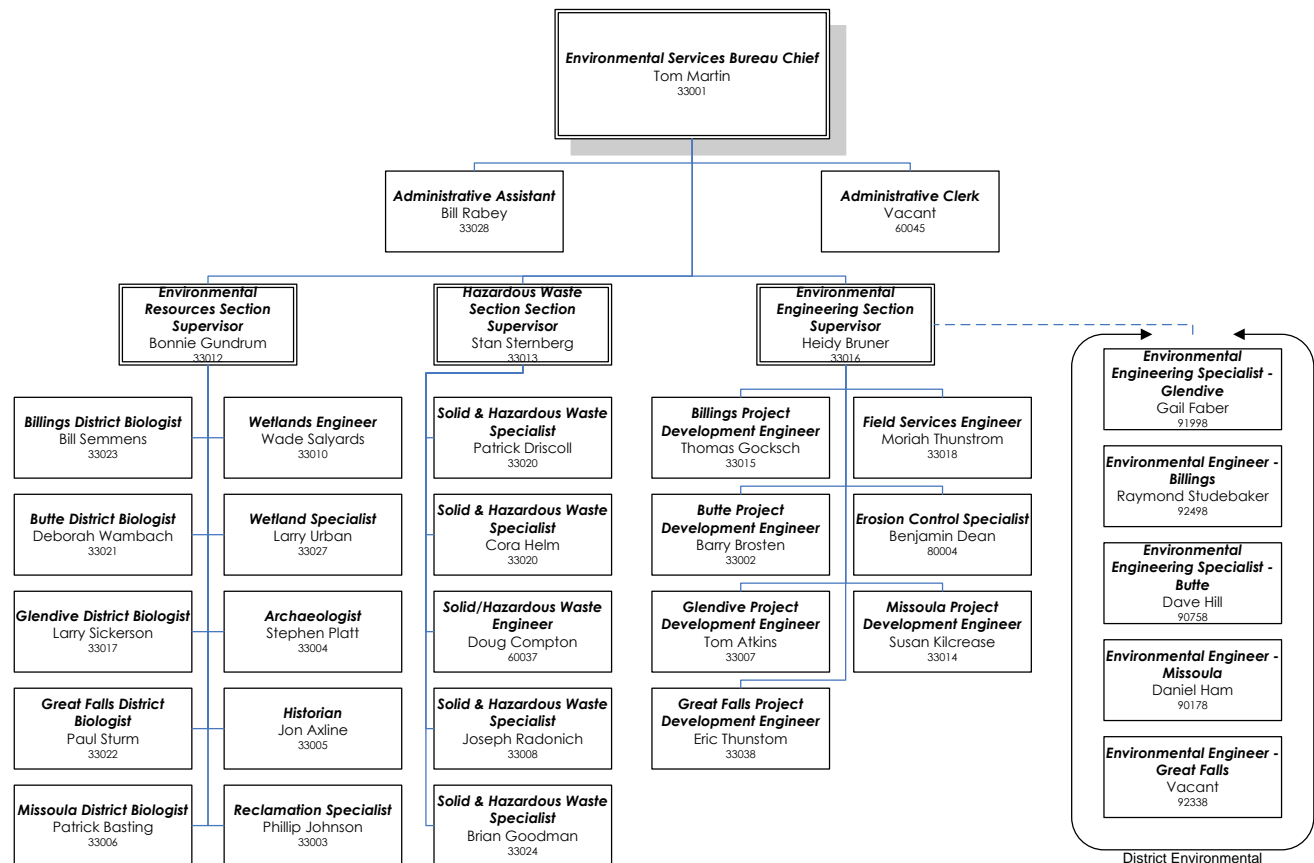
3. ***Attach an Organizational Chart.***

See following page.

Great Falls District Engineering Services



Rail, Transit, & Planning Environmental Services Bureau



= Position Number

District Environmental
Engineering Specialists

December 21, 2011

SECTION III - Minimum Qualifications - List minimum requirements for the first day of work.

Critical knowledge and skills required for this position:

KNOWLEDGE: Incumbent will need a working knowledge of transportation construction and maintenance activities and local, state, federal, and tribal water quality regulations, standards, and requirements; statewide construction project needs and processes; Department objectives; and practical environmental engineering applications to implement erosion control and permitting programs required for critical federal funding. Other problems involve site-specific environmental issues, unique construction requirements, and politically or technically contentious issues associated with construction project objectives and water quality regulations.

This position requires extensive knowledge of accepted and developmental theories, concepts, and principles of civil and environmental engineering and environmental resources as they relate to environmental resource management, water quality protection, and erosion and sediment control as well as related mathematics and physical sciences (e.g., hydrology, geotechnical analysis, soil mechanics, etc.). The position also requires knowledge of the methods and practices of highway construction; engineering and design; and related policies, methods, procedures, specifications, standards, and regulations; advanced research methods and techniques; environmental permitting processes and requirements; applicable state, federal, AASHTO, and FHWA requirements and standards; applicable state, federal, and tribal laws and permit requirements.

SKILLS: The incumbent must be able to effectively manage multiple tasks and prioritize those tasks based on critical risk assessment capabilities. The incumbent must communicate well with a wide variety of audiences. The incumbent must be able to work well independently and as part of a team.

Behaviors required to perform these duties:

See MDT Core Behaviors

Education:

Check the one box indicating minimum education requirements for this position for a new employee the first day of work:

- | | |
|---|--|
| <input type="checkbox"/> No education required | <input type="checkbox"/> Related AAS/2-years college/vocational training |
| <input type="checkbox"/> High school diploma or equivalent | <input checked="" type="checkbox"/> Related Bachelor's Degree |
| <input type="checkbox"/> 1-year related college/voc. training | <input type="checkbox"/> Related Master's degree |

Please specify the acceptable fields of study: The required Knowledge, Skills and Abilities are typically acquired through a combination of education and experience equivalent to a bachelor's degree in Environmental Engineering or another related field. Related degrees would include Civil Engineering and Construction Engineering.

Other education, training, certification, or licensing required (specify): Fundamentals of Engineering (FE) certificate is required.

Experience:

Check the one box indicating minimum work-related experience requirements for this position for a new employee the first day of work:

- | | |
|---|---|
| <input type="checkbox"/> No prior experience required | <input type="checkbox"/> 3 years |
| <input type="checkbox"/> 1 year | <input checked="" type="checkbox"/> 4 years |
| <input type="checkbox"/> 2 years | <input type="checkbox"/> 5 or more years |

Other specific experience (optional): Four (4) years of progressively responsible experience in civil, construction and/or environmental work. Experience in transportation is preferred.

Alternative Qualifications:

This agency will accept alternative methods of obtaining necessary qualifications.

☐ Yes ☒ No

Alternative qualifications include: N/A

SECTION IV – Other Important Job Information

- | | |
|--|--|
| <input type="checkbox"/> Fingerprint check | <input checked="" type="checkbox"/> Valid driver's license |
| <input type="checkbox"/> Background check | <input type="checkbox"/> Other; Describe |

Other information including working conditions such as shifts, lifting requirements, travel or hours. This position requires travel throughout the District typically in excess of 12,000 miles per year to conduct project reviews, inspections, and site evaluations; attend public/project meetings; and meet with government officials. Extended working hours and unusual shifts are required to meet project deadlines.

SECTION V – Signatures

Signature indicates this statement is accurate and complete.

Employee:

Name: _____ Title: _____

Signature: _____ Date: _____

Immediate Supervisor:

Name: _____ Title: _____

Signature: _____

Date: _____

Bureau Chief:

Name: _____

Title: _____

Signature: _____

Date: _____

Division/District Administrator:

Name: _____

Title: _____

Signature: _____

Date: _____

Department Designee:

Brent Rabe

Chief Human Resources Officer
Human Resources Division

Signature: _____

Date: _____